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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/734,034

12/11/2003

Munmaya K. Mishra

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63970 7590 07/23/2007  
MH2 TECHNOLOGY LAW GROUP (Cust. No. w/NewMarket)  
1951 KIDWELL DRIVE  
SUITE 550  
TYSONS CORNER, VA 22182

EXAMINER

GOLOBOY, JAMES C

ART UNIT

PAPER NUMBER

1714

MAIL DATE

DELIVERY MODE

07/23/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

**Office Action Summary**

Application No.

10/734,034

Applicant(s)

MISHRA ET AL.

Examiner

James Goloboy

Art Unit

1714

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 11 July 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-4, 6-11, 13, 15, 16, 18-24, 26, 28, 30, 31, 33-35, 37, 39, 40 and 42-44 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4, 6-11, 13, 15-16, 18-24, 26, 28, 30-31, 33-35, 37, 39-40, 42-44 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

**DETAILED ACTION**

***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114.

***Claim Rejections - 35 USC § 103***

2. Claims 1-4 and 8-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Samson (U.S. Pat. No. 4,605,808).

This rejection is adequately set forth in paragraph 2 of the office action mailed 3/12/07.

3. Claims 1, 7, 11, 13, 15-16, and 18-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Samson as applied to claims 1 and 4 above, and further in view of Papay (U.S. Pat. No. 5,652,201).

This rejection is adequately set forth in paragraph 3 of the office action mailed 3/12/07.

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4. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Papay further in view of Samson as applied to Claim 1 above, and further in view of Lundberg (U.S. Pat. No. 4,971,711).

This rejection is adequately set forth in paragraph 4 of the office action mailed 3/12/07.

5. Claims 20-23, 26, 28, 30-31, 33-35, 37, 39-40, and 42-44 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Samson and Papay as applied to claims 1, 7, 11, 13, 15-16, and 18-19 above, and further in view of Lambert (U.S. Pat. No. 5,888,947).

This rejection is adequately set forth in paragraph 5 of the office action mailed 3/12/07.

6. Claim 23 is rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Samson, Papay, and Lambert as applied to claims 20-23 above, and further in view of Galka (U.S. Pat. No. 6,427,647).

This rejection is adequately set forth in paragraph 6 of the office action mailed 3/12/07.

7. Claim 24 is rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Samson, Papay, and Lambert as applied to claim 20 above, and further in view of Albertson (U.S. Pat. No. 3,653,273).

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This rejection is adequately set forth in paragraph 7 of the office action mailed 3/12/07.

8. Claims 1-4 and 8-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Tokumoto (U.S. Pat. No. 6,300,444).

This rejection is adequately set forth in paragraph 8 of the office action mailed 3/12/07.

9. Claims 1, 7, 11, 13, 15-16, and 18-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Tokumoto as applied to claims 1 and 4 above, and further in view of Papay (U.S. Pat. No. 5,652,201).

This rejection is adequately set forth in paragraph 9 of the office action mailed 3/12/07.

10. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Papay further in view of Tokumoto as applied to Claim 1 above, and further in view of Lundberg.

This rejection is adequately set forth in paragraph 10 of the office action mailed 3/12/07.

11. Claims 20-23, 26, 28, 30-31, 33-35, 37, 39-40, and 42-44 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Tokumoto and Papay as

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applied to claims 1, 7, 11, 13, 15-16, and 18-19 above, and further in view of Lambert (U.S. Pat. No. 5,888,947).

This rejection is adequately set forth in paragraph 11 of the office action mailed 3/12/07.

12. Claim 23 is rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Tokumoto, Papay, and Lambert as applied to claims 20-23 above, and further in view of Galka (U.S. Pat. No. 6,427,647).

This rejection is adequately set forth in paragraph 12 of the office action mailed 3/12/07.

13. Claim 24 is rejected under 35 U.S.C. 103(a) as being unpatentable over Crawford in view of Samson, Papay, and Lambert as applied to claim 20 above, and further in view of Albertson (U.S. Pat. No. 3,653,273).

This rejection is adequately set forth in paragraph 13 of the office action mailed 3/12/07.

### ***Response to Arguments***

14. Applicant's arguments have been fully considered but they are not persuasive for the reasons stated in the advisory action mailed 6/21/07.

Applicant argues that Samson discloses an isomerization product of either a pure isobutene feedstock or a raffinate feedstock, but not a mixture. However, Samson also

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discloses in column 2 lines 35-49 (as cited in the office action mailed 8/30/06) that the feedstock can comprise from 10 to 100% by weight of isobutylene, preferably more than 40% by weight of isobutene, and also butane and normal butenes, which are additional components of raffinate. Therefore, it is the examiner's position that it would have been obvious to adjust the isobutene content of the feedstock of Samson within the range taught by Samson by combining the pure isobutene and raffinate feedstocks taught by Samson. As the reaction mixture of claim 1 comprises approximately 62.5 to 77.5% by weight of isobutene (assuming raffinate I comprises 50% by weight of isobutene), the range taught by Samson encompasses the claimed range. See MPEP 2144.05(I): "In the case where the claimed ranges "overlap or lie inside ranges disclosed by the prior art" a prima facie case of obviousness exists. *In re Wertheim*, 541 F.2d 257, 191 USPQ 90 (CCPA 1976);"

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to James Goloboy whose telephone number is 571-272-2476. The examiner can normally be reached on M-F 8-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vasu Jagannathan can be reached on 571-272-1119. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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/Vasu Jagannathan/  
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